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<b>Notice of References Cited</b>		Application/Control No. 09/845,353	Applicant(s)/Patent Under Reexamination STICE ET AL.	
		Examiner Deborah Crouch	Art Unit 1632	Page 1 of 3

**U.S. PATENT DOCUMENTS**

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Name	Classification
X	A	US-6,235,969 B1	05-2001	Stice et.al.	800/24
X	B	US-6,235,970 B1	05-2001	Stice et.al.	800/24
X	C	US-6,215,041 B1	04-2001	Stice et.al.	800/24
X	D	US-5,945,577	08-1999	Stice et.al.	800/24
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**FOREIGN PATENT DOCUMENTS**

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Country	Name	Classification
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	P					
	Q					
	R					
	S					
	T					

**NON-PATENT DOCUMENTS**

*		Include as applicable: Author, Title Date, Publisher, Edition or Volume, Pertinent Pages)
	U	Prather; Pigs is Pigs,2000, Science, Vol. 289: 1886-1887
	V	Fehilly et.al.; Interspecific chimaerism between sheep and goat, 1984, Nature, Vol. 307: 634-636.
X	W	Cisneros et.al., 1996,J. Animal Science 74: 925-933.
X	X	Cukrowska et.al., 1996, Immunology 87: 487-492.

\*A copy of this reference is not being furnished with this Office action. (See MPEP § 707.05(a).)  
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	09/845,353	STICE ET AL.
	Examiner	Art Unit
	Deborah Crouch	1632

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	A	US-			
	B	US-			
	C	US-			
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	R					
	S					
	T					

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X	U	Fodor et.al.; 1994, Proced. Natl. Acad. Sci. 91: 11153-11157. Strojek et.al.; 1990, Theriogenology 33: 901-913.
X	V	Brameld et.al.; 1995, J. Endocrin. 146: 239-245.
X	W	Onishi et.al.; 1994, Biology of Reproduction 51: 1069-1075.
X	X	Rosengard et.al.; 1995, Transplantation 59: 1325-1333.

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	A	US-			
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	V	
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**INFORMATION DISCLOSURE  
CITATION**

PTO-1449

ATTORNEY'S DKT NO.  
000270-012APPLICATION NO.  
08/888,057APPLICANT  
Steven L. STICE et alFILING DATE  
July 3, 1997GROUP  
1632

<b>U.S. PATENT DOCUMENTS</b>						
EXAMINER'S INITIALS	PATENT NO.	DATE	NAME	CLASS	SUBCLASS	FILING DATE
	5,523,226	05/14/93	Wheeler			
<b>FOREIGN PATENT DOCUMENTS</b>						
EXAMINER'S INITIALS	PATENT NO.	DATE	COUNTRY	CLASS	SUBCLASS	Translation Yes No
	WO 90/03432	04/05/90	International			
<b>OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)</b>						
	FIRST et al, Systems for Production of Calves from Cultured Bovine Embryonic Cells", <i>Reproduction, Fertility, and Development</i> , Vol. 6, pp 553-562 (1994)					
	BARTLETT et al, Evaluation of extracellular matrices and the plasminogen activator system in sheep inner cell mass and trophectodermal outgrowth <i>in vitro</i> , <i>Biology of Reproduction</i> , Vol. 52, pp 1426-1445 (1995)					
	TALBOT et al, <i>In vitro</i> pluripotency of epiblasts derived from bovine blastocysts, <i>Molecular Reproduction and Development</i> , Vol. 42, pp 35-52 (1995)					
	TALBOT et al, Culturing the epiblast cells of the pig blastocyst. <i>In Vitro Cellular and Development Biology</i> , Vol. 29A, pp. 543-554 (July 1993)					
	ANNELIES et al, Isolation and Characterization of Permanent Cell Lines from Inner Cell Mass Cells of Bovine Blastocysts, <i>Molecular Reproduction and Development</i> , Vol. 40, pp 444-454 (1995)					
	COLLAS et al, Nuclear Transplantation by Microinjection of Inner Cell Mass and Granulosa Cell Nuclei, <i>Molecular Reproduction and Development</i> , Vol. 38, pp. 264-267 (1994)					
	SIMS et al, Production of calves by transfer of nuclei from cultured inner cell mass cells, <i>Proceedings of the National Academy of Sciences, USA</i> , Vol. 90, pp 6143-6147 (June 1993)					
	Callard, R. et al., (1994), <i>The Cytokine Facts Book</i> , Academic Press, pages 163-167					
	Talbot et al. (1993), <i>In vitro Cellular and Development Biology</i> 29A, pages 543-554					
	Seamark et al., (1994), <i>Reproduction Fertility and Development</i> 6, pages 653-657					
	Bradley et al., (1992), <i>BioTechnology</i> 10, pages 534-539					
	Kappel et al. (1992), <i>Current Opinion in Biotechnology</i> 3, pages 548-553					
<b>EXAMINER</b>	<b>DATE CONSIDERED</b>					

EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

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INFORMATION DISCLOSURE CITATION			ATTORNEY'S DKT NO. 000270-012		APPLICATION NO. 08/888,057	
			APPLICANT Steven L. STICE et al			
PTO-1449			FILING DATE July 3, 1997		GROUP 1632	
<b>U.S. PATENT DOCUMENTS</b>						
EXAMINER'S INITIALS	PATENT NO.	DATE	NAME	CLASS	SUBCLASS	FILING DATE
	5,523,226	05/14/93	Wheeler	/	/	
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EXAMINER'S INITIALS	PATENT NO.	DATE	COUNTRY	CLASS	SUBCLASS	Translation Yes No
	WO 90/03432	04/05/90	International	/	/	
<b>OTHER DOCUMENTS</b> (Including Author, Title, Date, Pertinent Pages, Etc.)						
<i>dc</i>	FIRST et al, Systems for Production of Calves from Cultured Bovine Embryonic Cells", <i>Reproduction, Fertility, and Development</i> , Vol. 6, pp 553-562 (1994)					
	BARTLETT et al, Evaluation of extracellular matrices and the plasminogen activator system in sheep inner cell mass and trophectodermal outgrowth <i>in vitro</i> , <i>Biology of Reproduction</i> , Vol. 52, pp 1426-1445 (1995)					
	TALBOT et al, <i>In vitro</i> pluripotency of epiblasts derived from bovine blastocysts, <i>Molecular Reproduction and Development</i> , Vol. 42, pp 35-52 (1995)					
	TALBOT et al, Culturing the epiblast cells of the pig blastocyst. <i>In Vitro Cellular and Development Biology</i> , Vol. 29A, pp. 543-554 (July 1993)					
	ANNELIES et al, Isolation and Characterization of Permanent Cell Lines from Inner Cell Mass Cells of Bovine Blastocysts, <i>Molecular Reproduction and Development</i> , Vol. 40, pp 444-454 (1995)					
	COLLAS et al, Nuclear Transplantation by Microinjection of Inner Cell Mass and Granulosa Cell Nuclei, <i>Molecular Reproduction and Development</i> , Vol. 38, pp. 264-267 (1994)					
	SIMS et al, Production of calves by transfer of nuclei from cultured inner cell mass cells, <i>Proceedings of the National Academy of Sciences, USA</i> , Vol. 90, pp 6143-6147 (June 1993)					
	Callard, R. et al., (1994), <i>The Cytokine Facts Book</i> , Academic Press, pages 163-167					
	Talbot et al. (1993), <i>In vitro Cellular and Development Biology</i> 29A, pages 543-554					
	Seamark et al., (1994), <i>Reproduction Fertility and Development</i> 6, pages 653-657					
	Bradley et al., (1992), <i>BioTechnology</i> 10, pages 534-539					
<i>dc</i>	Kappel et al. (1992), <i>Current Opinion in Biotechnology</i> 3, pages 548-553					
EXAMINER	<i>Deborah Cronch</i>		DATE CONSIDERED <i>7/31/99</i>		RECEIVED <i>SEP 6 1999</i>	

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INFORMATION DISCLOSURE CITATION			ATTORNEY'S DKT NO. 000270-012	APPLICATION NO. 08/888,057		
			APPLICANT Steven L. Stice et al.			
			FILING DATE July 3, 1997	GROUP 1623		
<b>U.S. PATENT DOCUMENTS</b>						
EXAMINER'S INITIALS	PATENT NO.	DATE	NAME	CLASS	SUBCLASS	FILING DATE
<b>FOREIGN PATENT DOCUMENTS</b>						Translation <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
EXAMINER'S INITIALS	PATENT NO.	DATE	COUNTRY	CLASS	SUBCLASS	
dc	WO 91/13150 A	09/05/91	International	/	/	
	WO 94/29442 A	12/22/94	International	/	/	
dc	WO 97/37009 A	10/09/97	International	/	/	
<b>OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)</b>						
dc	Sims et al., (1994) <i>Proc. Natl. Acad. Sci USA</i> 91, pages 6143-6147					
dc	Stice et al., "Pluripotent Bovine Embryonic Cell Lines Direct Embryonic Development Following Nuclear Transfer", <i>Biology of Reproduction</i> , vol. 54, no. 1, January 1996, pages 100-110					
dc	Cibelli J.B. et al., "Production of germline chimeric bovine fetuses from transgenic embryonic stem cells", <i>Theriogenology</i> , vol. 47, No. 1, January 1997, page 241					
EXAMINER	Deborah Crouse			DATE CONSIDERED 7/31/99		

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## Notice of References Cited

Application No. 08/888,057	Applicant(s) Stice et al.
Examiner Deborah Crouch	Group Art Unit 1632

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### U.S. PATENT DOCUMENTS

	DOCUMENT NO.	DATE	NAME	CLASS	SUBCLASS
A	4,994,384	2/9/91	Prather et al	435	172.3
B					
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### FOREIGN PATENT DOCUMENTS

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### NON-PATENT DOCUMENTS

	DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
U	Wilmut et al (1997) Nature 385, 810-813.	
V	Sims et al (1993) Proced. Natl. Acad. Sci. 90, 6143-6147.	
W	Campbell et al (1996) Nature 64-66.	
X	Schultz et al (1995) Seminars in Cell Biology 6, 201-208.	

## Notice of References Cited

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### U.S. PATENT DOCUMENTS

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### NON-PATENT DOCUMENTS

	DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
U	Kappell et al (1992) Current Opinion in Biotechnology 3, 548-553.	
V	Wall (1996) Theriogenology 45, 57-68.	
W	Houdebine (1994) Journal of Biotechnology 34, 269-287.	
X	Mullins et al (1996) Journal of Clinical Investigation 98, S37-S40.	

**Notice of References Cited**Application No.  
08/888,057

Applicant(s)

Stice et al.

Examiner

Deborah Crouch

Group Art Unit

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**U.S. PATENT DOCUMENTS**

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	DOCUMENT (including Author, Title, Source, and Pertinent Pages)	DATE
U	Seamark (1994) Reproductive Fertility and Development 6, 653-657.	
V	Cisneros et al (1996) J. Animal Science 74, 925-933.	
W	Cukrowska et al (1996) Immunology 87, 487-492.	
X	Fodor et al (1994) Proced. Natl. Acad. Sci. 91, 11153-11157.	

**Notice of References Cited**

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**U.S. PATENT DOCUMENTS**

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	DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
U	Strojek et al 1990) Threioigenology 33, 901-913.	
V	Brameld et al (1995) J. Endocrin. 146, 239-245.	
W	Onishi et al (1994) Biology of Reproduction 51, 1069-1075.	
X	Rosengard et al (1995) Transplantation 59, 1325-1333.	

## Notice of References Cited

Application No. 08/888,057	Applicant(s) Stice et al.
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### U.S. PATENT DOCUMENTS

*	DOCUMENT NO.	DATE	NAME	CLASS	SUBCLASS
x A	4,994,384	2/1991	Pather et al	800	24
x B	5,057,420	10/1991	Massey	800	24
x C	6,147,276	11/2000	Campbell et al	800	24
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### FOREIGN PATENT DOCUMENTS

*	DOCUMENT NO.	DATE	COUNTRY	NAME	CLASS	SUBCLASS
x N	WO 95/16770	6/1995	World		—	—
x O	WO 95/17500	6/1995	World		—	—
x P	WO 95/34696	12/1995	World		—	—
x Q	WO 96/07732	3/1996	World		—	—
x R	WO 97/07668	3/1997	World		—	—
x S	WO 97/07669	3/1997	World		—	—
x T	WO 97/37009	10/1997	World		—	—

### NON-PATENT DOCUMENTS

*	DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
x U	Theriogenology, vol. 45, No. 1, p. 287, XP000605648.	
x V	Journal of Reproduction and Fertility Supplement, vol. 5, Jan. 1995, p. 60, P000607293.	
x W	Molecular Reproduction and Development, vol. 38, No. 3, Jul. 1994, pp. 264-267, XP002067033.	
x X	Theriogenology, vol. 47, No. 1, p. 241, XP002067034.	

\* A copy of this reference is not being furnished with this Office action.  
(See Manual of Patent Examining Procedure, Section 707.05(a).)

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**NON-PATENT DOCUMENTS**

*		DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
x	u	Nature, vol. 385, No. 6619, pp. 810-813, XP002067035.	
x	v	Science, vol. 278, No. 5346, pp. 2130-2133, XP002067036.	
x	w	Biology of Reproduction, vol. 57, No. 2, pp.385-393, XP002067037.	
x	x	Journal of Neurochemistry, vol. 70, No. suppl. 1, p. S46, XP002067038.	

\* A copy of this reference is not being furnished with this Office action.  
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**NON-PATENT DOCUMENTS**

*		DOCUMENT (Including Author, Title, Source, and Pertinent Pages)	DATE
x	u	Theriogenology, vol. 49, No. 1, pp. 129-138, XP002067444.	
x	v	Sims et al. (1993) Proc. Natl. Acad. Sci. 90, 6143-6147.	
x	w	Kono et al (1995) Expt. Cell Res. 221, 478-485.	
x	x	Lovell-Badge et al Cold Spring Harbor Symp. Quant. Biol. (1985), 50 (Mol. Biol. Devel.), Cold Spring Harbor Lab. Press, Cold Spring Harbor, NY, pp. 707-711.	

\* A copy of this reference is not being furnished with this Office action.  
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